

Release B CDR RID Report

Date Last Modified 8/9/96

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Document

RID ID CDR 62

Review Release B CDR

Originator Ref

Priority 2

Section

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Figure Table

Category Name Planning (PLS) Design

Actionee ECS

Sub Category

Subject

Description of Problem or Suggestion:

Does the planning subsystem track whether the mission deadlines (e.g., 24 hours after receipt of all necessary data for L1, L2, L3) are being met?

Originator's Recommendation

Provide warning of processes which will miss their mission deadlines. Provide warning of processes which will miss their modeled mission deadline, e.g., 24 hours after predicted receipt of data. (This is how OPS WG plans to handle notification of inter-DAAC deadline problems).

GSFC Response by:

GSFC Response Date

HAIS Response by:

HAIS Schedule

HAIS R. E. C. Schwartz

HAIS Response Date 7/16/96

The PDPS design already includes the request functionality for tracking and alarm notification of mission deadlines to the extent that the COTS permits. PDPS currently has in its design the ability to set a "target delta" for a Production Request. This is the amount of time after the input data is available for the single execution of a PGE (a Data Processing Request) that the PGE should run. It was designed to track mission deadlines.

When a candidate plan is created, the "Target Date Report" will indicate if any DPRs will be run past their "target delta" times. This report will indicate all DPRs that are not scheduled to start before their alarm time = target delta time minus their estimate runtime. For each DPR in the report, their scheduled start time in the candidate plan will be displayed, along with their alarm time. The Production Planner can then make a decision whether or not this candidate plan meets enough of the targets to be activated. Once a plan is activated, remote DAACs interested in the data produced at this DAAC will receive the updated data availability times automatically via a PDAS.

After a plan is activated and the DPR is placed into the Processing Queue, this same time will be used by a late start monitor to ensure that the DPR will be completed before its target delta; if not, an local operator is notified via an AutoSys alarm (AutoSys does not have the capability to send alarms to remote DAACs). This alarm will indicate that the problem is a job not starting in time, the DPRid of the job, and the time that the DPR should have started. The Production Monitor then can determine why the job is late and what to do about it. For example, if the job simply has too low of a priority, it's priority can be increased. If a job is still on hold because it doesn't have all it's data, the Production Monitor can determine what data is unavailable (using a simple SYBASE query on the PDPS database) and take action accordingly. If a large number of DPRs are causing alarms, the Production Monitor can replan, and again remote DAACs will be notified automatically via a PDAS.

Status Closed

Date Closed 8/9/96

Sponsor Kempler

***** Attachment if any *****